

LAB 03

HBASE Commands

Execute the following HBASE commands to understand the database setting.

1. sudo jps

check for “HMaster” service

2. sudo service hbase-master start

3. hbase shell

hbase shell to start the hbase.

4. create 'table1test','cf'

5. list

create Table

Syntax: create 'table_name','column_family'

6. create 'hbasetable2test','cf'

Store Data

Syntax: put 'table_name', 'ROW_KEY','column_family:column_name','value'

7. put 'hbasetable2test', 'r1','cf:c1' , 'riyaz'

8. put 'hbasetable2test', 'r1','cf:c2' , 'lee'

9. put ' hbasetable2test', 'r1','cf:c3' , 'siti'

row key -we will mention the row key. In programming, it will auto generate.

cf - Column family, c1 is the column name

v1-value

Datatype - by default it stores as bytearray.

Each row can have different number of columns.

get the value from hbase

Syntax: scan 'table_name'

Syntax: get 'table_name','ROW_KEY'

10. scan 'hbasetable2test'

timestamp = XXXXXX (By defualt hadoop will replicate. similarly, hbase also will maintain three different version of particular column value)

11. get 'hbasetable2test' , 'r1'

update/Modify

Syntax: put 'table_name', 'ROW_KEY','column_family:column_name','modified_value'

- 12. put 'hbasetable2test' , 'r1', 'cf:c3' , 'v3_upadte'**
- 13. put 'hbasetable2test' , 'r1', 'cf:c3' , 'v3_upadte_Riyaz'**

alter table

```
step 1:: disable 'table_name'
drop 'table_name'
disable 'hbasetable2test' // local
alter 'hbasetable2test' , {NAME=>'cf_altered'}
enable 'hbasetable2test'
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- 14. describe 'hbasetable2test'**
- 15. put 'hbasetable2test' , 'r1' , 'cf_altered:c3','riyaz'**
- 16. scan 'hbasetable2test'**

Delete data

Syntax:delete 'table_name', 'ROW_KEY','column_family:column_name'

- 17. delete 'hbasetable2test' , 'r1' , 'cf:c3'**

drop table

- 18. disable 'hbasetable2test'**
- 19. drop 'hbasetable2test'**
- 20. list**

General HBase shell commands

	Show cluster status. Can be 'summary', 'simple', or 'detailed'. The default is 'summary'.
status	hbase> status 'simple' hbase> status 'summary' hbase> status 'detailed'
version	Output this HBase version Usage: hbase> version
whoami	Show the current hbase user. Usage: hbase> whoami

Practical activities evidence for submission

Activity: HBase Table Creation

Objective: Create an HBase table with the following column families: personal, name, age, and gender.

Execute five HBase commands to manage the table.

1. Open your HBase shell or client.
2. Create an HBase table named "student_info" with the specified column families: personal, name, age, and gender.
3. Update Records
4. Delete Records
5. Insert New Data

You need to attach evidence of completion in the Spectrum Practical-3 Submission link.

Save and submit your Lab documents in PDF with the following filename format.

- a. Screenshot evidence for commands execution.

Save and submit your Lab documents in **PDF** with the following filename format.

Name_ID_Lab2	E.g.: E.g.: Riyaz-123456-Lab2.pdf
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